

## U.S. Army Corps Of Engineers Case Study



### ThunderCat and Lockheed Martin Team Up to Provide Solutions for USACE

#### Background

The U.S. Army Corps of Engineers (USACE) mission is to provide vital public engineering services in peace and war to strengthen our Nations security, energize the economy, and reduce risks from disasters. As part of this mission, they are responsible for investigating, developing and maintaining the nation's water and related environmental resources. To support this charter, a healthy, reliable, IT infrastructure is required. Unfortunately, USACE maintained a challenging, legacy, compute environment. This environment was costly to maintain. Both OEM support and staffing costs were exorbitant. This made service delivery very difficult, and ultimately led to a sub-optimal end-user experience.

#### Challenge

USACE realized a change was required. With the help of Lockheed Martin (LM) and ThunderCat Technology, USACE plotted a path forward. After a careful analysis, USACE determined a virtualized service delivery platform would best meet their needs. *The goal: reduce acquisition costs with virtualized servers and storage and minimize ongoing spend.* Ultimately this will allow for an optimized, more repeatable, end-user experience.

#### Approach

A project of this magnitude requires a strong, cohesive, team. LM and ThunderCat partnered with best of breed manufacturers, VMware, NetApp, Cisco and Dell, to architect a world-class service delivery platform. District Office IT services will be delivered from a pool of virtualized Dell servers connected to NetApp FAS storage via Cisco Nexus switches. These 'platforms' will be delivered to over 50 USACE field sites across the country. LM service teams will deploy and convert existing physical systems to virtual machines. NetApp's SnapManager for Virtual Infrastructure (SMVI) will back up the virtual servers. SMVI's snapshots will be transmitted via SnapVault to a central processing center. There, a catalog of recovery points will be maintained for quick, reliable recoveries if needed

#### Results

Pilots are ongoing and initial results are very impressive. Platform deployment has exceeded expectations and services are steady and reliable. Overall performance has improved and end-users are excited. LM can expect to dramatically reduce their capital acquisition spend. Virtualized servers and storage will enable USACE to realize more computing power for their dollar. Additionally, services will become more cost-effective and repeatable. This consolidation effort will lead to a more repeatable, reliable, optimal end-user experience enabling USACE to better support its mission.